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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/957,421	09/20/2001	Michael Edward Aho	ROC920010145US1	2709
7590	09/22/2005		EXAMINER	
Grant A. Johnson IBM Corporation - Dept. 917 3605 Highway 52 North Rochester, MN 55901				REVAK, CHRISTOPHER A
		ART UNIT	PAPER NUMBER	2131

DATE MAILED: 09/22/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/957,421	AHO ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Christopher A. Revak	2131	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

1) Responsive to communication(s) filed on 20 September 2001.  
 2a) This action is FINAL.                    2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

4) Claim(s) 1-20 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_\_ is/are allowed.  
 6) Claim(s) 1-20 is/are rejected.  
 7) Claim(s) \_\_\_\_\_ is/are objected to.  
 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on 20 September 2001 is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All    b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413)
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Date. _____
3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date <u>9/20/01</u> .	5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)
	6) <input type="checkbox"/> Other: _____

## **DETAILED ACTION**

### ***Information Disclosure Statement***

1. The information disclosure statement (IDS) submitted on September 20, is in compliance with the provisions of 37 CFR 1.97. Accordingly, the examiner is considering the information disclosure statement.

### ***Claim Rejections - 35 USC § 101***

2. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. Claims 1-15 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. The claims currently recite of software alone and of itself that is not tangibly embodied.

### ***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claims 1-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Apperson et al, U.S. Patent 5,978,484 in view of Atkinson et al, U.S. Patent 5,892,904.

As per claim 1, Apperson et al discloses of a core product load manifest for protecting ongoing system integrity of a software product having a plurality of pieces. The core product load manifest includes header attributes of the software product. A list including a plurality of manifest items that identify a corresponding piece of the software product, each manifest item includes an attribute. The file is signed with a digital signature that includes the attributes, each of the plurality of items, and the item attribute that is included (col. 2, lines 40-53; col. 6, lines 43-48; and col. 13, lines 1-4). The teachings of Apperson et al are silent in disclosing of the usage of a header comprising information, or attributes, about the software product. In a related teaching, Atkinson et al discloses of a header that includes identifying information about a file such as characteristics of the file (col. 11, lines 37-42 and col. 12, lines 4-5 & 33-35). It would have been obvious to a person of ordinary skill in the art at the time of the invention to have been motivated to include identifying information about a file in the header. Atkinson et al recites of motivational benefits similar to Apperson et al in that signing of an executable file ensures the authenticity and integrity of the executable file to that it can be transmitted with confidence to a recipient (col. 2, lines 33-40). It is obvious that teachings of Apperson et al would have been able to be modified to incorporate the usage of a header comprising attribute information about a file so that it can aid in the authenticity and integrity process of a transmitted file as is taught by Atkinson et al.

As per claim 2, it is taught by Apperson et al of an attribute item including a predefined attribute identifying the corresponding piece of software product as being signed (col. 2, lines 44-47).

As per claim 3, Apperson et al teaches of a digital signature of the signed piece of software product is stored with the signed corresponding piece of and the signature is excluded from the manifest item identifying the signed corresponding piece of software product (col. 2, lines 47-54; col. 3, lines 9-14; and col. 6, lines 43-48).

As per claim 4, it is disclosed by Apperson et al that the signature of each signed corresponding piece of the software product and the manifest digital signature includes a single certificate (col. 2, lines 44-50 and col. 6, lines 43-48).

As per claim 5, the teachings of Apperson et al disclose a mechanism that allows for servers to download code with the client being able to validate their origin and authenticity (col. 2, lines 35-38) and it is interpreted by the examiner that an amended manifest is generated for identifying added and deleted pieces of the software product as any changes occur to the code so that they can be indicated to the client in order to maintain the origin and authenticity of the modified code.

As per claim 6, Apperson et al recites of chaining the core product manifest (col. 8, line 65 through col. 9, line 4).

As per claims 7 and 16, it is disclosed by Apperson et al of a method and computer program product including computer executable instructions stored on a computer readable medium for protecting ongoing system integrity of a software product having a plurality of pieces. A product load manifest is created for the software product

Art Unit: 2131

and it includes attributes of the software product, a list of a plurality of manifest items.

Each manifest item includes an attribute identifying the corresponding piece of software product as being signed and includes the digital signature, each of the plurality of items, and each of the item attribute included in the digital signature (col. 2, lines 40-53). The teachings of Apperson et al are silent in disclosing of the usage of a header comprising information, or attributes, about the software product. In a related teaching, Atkinson et al discloses of a header that includes identifying information about a file such as characteristics of the file (col. 11, lines 37-42 and col. 12, lines 4-5 & 33-35). It would have been obvious to a person of ordinary skill in the art at the time of the invention to have been motivated to include identifying information about a file in the header.

Atkinson et al recites of motivational benefits similar to Apperson et al in that signing of an executable file ensures the authenticity and integrity of the executable file to that is can be transmitted with confidence to a recipient (col. 2, lines 33-40; col. 6, lines 43-48; col. 10, lines 28-29; and col. 13, lines 1-4). It is obvious that teachings of Apperson et al would have been able to be modified to incorporate the usage of a header comprising attribute information about a file so that it can aid in the authenticity and integrity process of a transmitted file as is taught by Atkinson et al.

As per claims 8 and 19, Apperson et al discloses of creating the product load manifest for the software product includes receiving a certificate and copying the certificate in the file (col. 2, lines 47-54). The teachings of Atkinson et al are relied upon for the use of a header comprising information about the file, please refer above to the

motivational benefit of a header comprising file information as is taught by Atkinson et al.

As per claims 9 and 20, it is taught by Apperson et al of computing a digital signature of each signed piece of the software product includes utilizing the certificate and private key for computing the digital signature of each signed piece of the software product (col. 2, lines 47-54; col. 6, lines 43-48; and col. 8, lines 17-25).

As per claims 10 and 17, the teachings of Apperson et al disclose a mechanism that allows for servers to download code with the client being able to validate their origin and authenticity (col. 2, lines 35-38) and it is interpreted by the examiner that an amended manifest is generated for identifying added and deleted pieces of the software product as any changes occur to the code so that they can be indicated to the client in order to maintain the origin and authenticity of the modified code.

As per claim 11, Apperson et al recites of chaining the core product manifest (col. 8, line 65 through col. 9, line 4).

As per claims 12-14 and 18, the teachings of Apperson et al disclose a mechanism that allows for servers to download code with the client being able to validate their origin and authenticity and chaining the core product manifest (col. 2, lines 35-38 and col. 8, line 65 through col. 9, line 4) and it is interpreted by the examiner that an amended manifest is generated for identifying added and deleted pieces of the software product as any changes occur to the code so that they can be indicated to the client in order to maintain the origin and authenticity of the modified code. The teachings of Atkinson et al are relied upon for the use of a header comprising

Art Unit: 2131

information about the file, please refer above to the motivational benefit of a header comprising file information as is taught by Atkinson et al wherein Atkinson et al further recites of a link, or pointer to additional information included within the header (col. 6, lines 6-27).

As per claim 15, Apperson et al teaches of creating the product load manifest for the software product includes a pattern attribute of the software product (col. 2, lines 44-47). The teachings of Atkinson et al are relied upon for the use of a header comprising information about the file, please refer above to the motivational benefit of a header comprising file information as is taught by Atkinson et al

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Christopher A. Revak whose telephone number is 571-272-3794. The examiner can normally be reached on Monday-Friday, 6:30am-3:00pm.

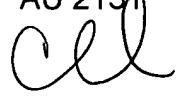
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ayaz Sheikh can be reached on 571-272-3795. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2131

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

CR  
  
September 16, 2005

Christopher Revak  
Primary Examiner  
AU 2131



9/16/05